

## IN THE SPECIFICATION

Please replace the indicated paragraphs with the following replacement paragraphs:

*At page 32, lines 12-15:*

B<sup>1</sup> Other peptides (peptide 1-12, excluding 3, 7 and 9) were derived either from the N or C terminal ends of arp protein or from type I or III ~~or IV~~ repeats. Immunogenic reactivity was found to be specific in some peptides to the amino acid sequence DVPK. The results of this study are provided in FIG. 3.

*At page 32, line 22 through page 33, line 7:*

B<sup>2</sup> The *arp* genes of two type strains, CDC-2 and Bosnia, from each of the *T. pallidum* subspecies, *T. pallidum* ssp. *pertenue* and *T. pallidum* ssp. *endemicum*, were cloned and tested. The gene sequences showed significant homology with the Nichols strain of *T. pallidum* ssp. *pallidum*. The 5' end and 3' end of the genes of the three subspecies are completely identical, while the repeat regions showed some variations. The interesting observation was that the translated arp protein of the two subspecies showed a single type of repeats, type II, which is the predominant type in the Nichols strain. This finding confirms that those peptides synthesized in regions with the predominant type of repeat (type II) are immunogenic (as shown in FIG. 4). The other repeats (types I and III, ~~and IV~~) are also immunogenic.